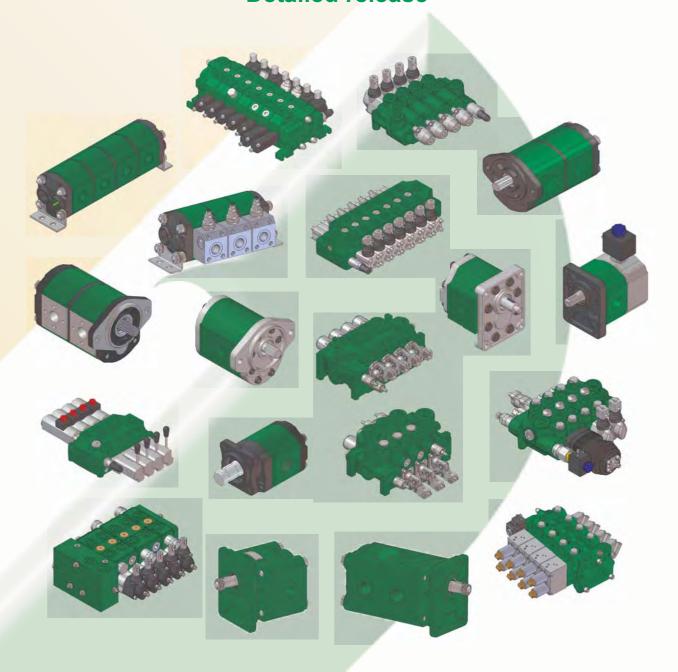
# **RANGE OF PRODUCTS OVERVIEW**

## **Detailed release**



FLUID POWER COMPONENTS

E0.00.0213.03.00

COMPANY WITH QUALITY MANAGEMENT
SYSTEM CERTIFIED BY DNV
= ISO 9001:2008 =

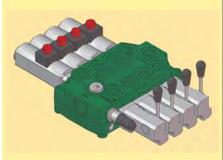




pag 1	DIRECTIONAL CONTROL VALVES MONOBLOCK TYPE
pag 3	DIRECTIONAL CONTROL VALVES SECTIONAL TYPE
pag 5	DIRECTIONAL CONTROL VALVES ESPECIALLY DESIGNED FOR OEMS
pag 6	PRESSURE COMPENSATED LOAD SENSING VALVE
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pag 14	CUSTOMIZED GEAR MOTORS AND PUMPS - ACCESSORIES

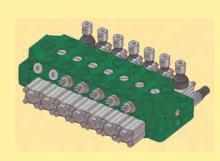
# **MONOBLOCK TYPE**

#### VDM6



- cast-iron monoblock construction.
- parallel circuit, load check valve protection on down-stream of the pressure "P" line.
- tandem circuit, only the first working section,
- I.c.v. protection + I.c.v. protection on down-stream of the "P" line.
- possibility of power beyond.
- spool construction in steel, hardened and nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeabilty of all the spools.
- several spool control devices and spool positioning devices.

### VDM6A



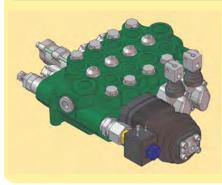
- cast-iron monoblock construction.
- parallel circuit, load check valve protection on each section.
- possibility of power beyond configuration.
- spool construction in steel, hardened and chromium-plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeability of all the spools.
- possibility of auxiliary valve either on port A or B or on both.
- several spool control devices and spool positioning devices.

#### VDM09



- cast-iron monoblock construction.
- parallel circuit, load check valve protection on down-stream of the pressure "P" line.
- possibility of power beyond.
- spool construction in steel, hardened and nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- several spool control devices and spool positioning devices.

### VDM8



- cast-iron monoblock construction.
- parallel circuit, load check valve protection on each section.
- possibility of power beyond configuration.
- spool construction in steel, hardened and chromium-plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeability of all the spools.
- possibility of auxiliary valve either on port A or B or on both.
- several spool control devices and spool positioning devices.

### Main characteristics

	NOMINAL FLOW	OPERATING PRESSURE	NR.OF SECTION	CIRCUIT*	SECTION DISTANCE		STANDARD (referred				
TYPE	(I/min - US gpm)	(bar - <i>psi</i> )			(mm - <i>in</i> )	<b>BSP</b> (ISO 228/1)	UN-UNF (ISO 11926-1)	METRIC (ISO 262)	<b>METRIC</b> (ISO 6149-1)		
VDM6	45 - 12	315 - 4600	1 ÷ 7	P/T <sup>(1)</sup>	32 - 1,26	G3/8	SAE 8	M18x1.5	M18x1.5		
VDM6A	45 - 12	315 - <i>4600</i>	1 ÷ 7	Р	36 - 1,42	G3/8 <sup>(2)</sup>	SAE 8	M18x1.5	M18x1.5		
VDM09	75 - 20	280 - 4000	1 ÷ 6	Р	38 - 1,50	G1/2	SAE 10	M22x1.5	M22x1.5		
VDM8	75 - 20	315 - <i>4600</i>	1 ÷ 7 <sup>(3)</sup>	Р	40 - 1,57	G1/2	SAE 10	M22x1.5	M22x1.5		

### Configuration

	VDM6	VDM6A	VDM09	VDM8
CONTROLS				
Mechanical	•	•	•	•
Hydraulic	•	•	•	•
Pneumatic	•	•	•	•
Direct electric	•	•		•
Electro-hydraulic		•		•
Electro-pneumatic	•	•	•	•
AUXILIARY VALVES				
On ports		•		•
Unloader valve	•	•		•

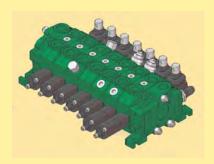
<sup>(\*)</sup> P=parallel / S=series / T=tandem
(1) Tandem circuit available only on the first working section of the 4, 5 and 6 working sections monoblocks.

<sup>(2)</sup> G1/2 ports also available, for other size ports please get in touch with our sales dept.

<sup>(3) 6</sup> and 7 working sections monoblocks are still work in progress.

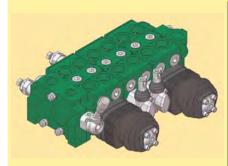
# **SECTIONAL TYPE**

### VD6A



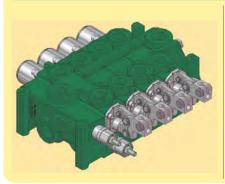
- cast-iron made (inlet section, working section, outlet section).
- parallel circuit, load check valve protection on each section.
- series circuit, load check valve protection on each section (possibility of 2nd load check valve on series line)
- tandem circuit, load check valve protection on each section.
- inlet with adjustable pressure compensated priority flow valve built-in available.
- possibility of power beyond configuration and possibility of closed center.
- spool construction in steel, hardened and nichel-plated
- to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeabilty of all the spools.
- several spool positioning devices.

#### VD8A



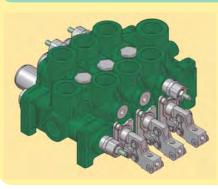
- cast-iron made (inlet section, working section, outlet section).
- parallel circuit, load check valve protection on each section.
- series circuit, load check valve protection on each section (possibility of 2nd load check valve on series line)
- tandem circuit, load check valve protection on each section.
- working section with pressure compensated priority flow valve built-in available.
- possibility of power beyond configuration and possibility of closed center.
- spool construction in steel, hardened and nichel-plated
- to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeabilty of all the spools.
- several spool positioning devices.

#### VD10A



- cast-iron made (inlet plus working module, single working module, outlet module).
- parallel circuit, load check valve protection on each section.
- series circuit, load check valve protection on each section. (series line realized inside of the spool with dedicated lcv.).
- tandem circuit, load check valve protection on each section.
- possibility of power beyond configuration.
- spool construction in steel, nickel plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position etc.
- available spool with hydraulic kick-out built-in
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeabilty of all the spools.
- several spool positioning devices.

#### VD12A



- cast-iron made (inlet module or inlet plus working module, single working module, outlet module).
- parallel circuit, load check valve protection on each section.
- series circuit, load check valve protection on each section. (series line realized inside of the spool with dedicated lcv.).
- tandem circuit, load check valve protection on each section.
- possibility of power beyond configuration.
- spool construction in steel, nickel plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeabilty of all the spools.
- several spool positioning devices.



### **Main characteristics**

	NOMINAL FLOW	OPERATING PRESSURE	NR. OF SECTIONS	CIRCUIT*	SECTION DISTANCE		STANDARD (referred		
TYPE	(I/min - <i>US gpm</i> )	(bar - <i>psi</i> )			(mm - <i>in</i> )	<b>BSP</b> (ISO 228/1)	UN-UNF (ISO 11926-1)	METRIC (ISO 262)	METRIC (ISO 6149-1)
VD6A	45 - 12	315 - <i>4600</i>	1 ÷ 8 <sup>(1)</sup>	P/S/T	35.5 - 1.40	G3/8	SAE 8	M18x1.5	M18x1.5
VD8A	75 - 20	315 - 4600	1 ÷ 8 <sup>(1)</sup>	P/S/T	40 - 1.57	G1/2 G3/4 <sup>(2)</sup>	SAE 10	M22x1.5	M22x1.5
VD10A	120 - 32	280 - 4000	1 ÷ 8 <sup>(1)</sup>	P/S/T	46 - 1.81	G3/4	SAE 12		
VD12A	180 - <i>48</i>	280 - 4000	1 ÷ 8 <sup>(1)</sup>	P/S/T	52 - 2.05	G1	SAE 16		

### Configuration

	VD6A	VD8A	VD10A	VD12A
Controls				
Mechanical	•	•	•	•
Hydraulic	•	•	•	•
Pneumatic	•	•	•	•
Direct electric	•	•		
Electro-hydraulic	•	•	•	•
Elettro-pneumatic	•	•	•	•
Auxiliary valves				
On ports	•	•	•	•
Unloader valve	•	•	•	•
Intermediate sections				
Mid return manifold	•	•	•	•
With secondary inlet	•	•	•	•
With service relief valve	•	•	•	•
With flow control	•	•		
With priority flow valve			•	•

<sup>(\*)</sup> P=parallel / S=series / T=tandem
(1) For more working sections, please contact our sales department.
(2) These threads are available only on body without auxiliary valve seat.

# **DIRECTIONAL CONTROL VALVES**

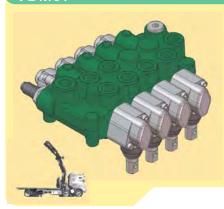
expecially designed for OEMS

### VDM071/VDM091/VD6A



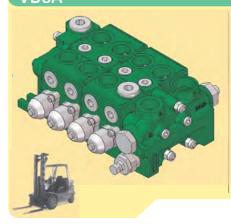
- especially designed for tractor.
- cast-iron monoblock construction available with 3 and/or 4 spools.
- tandem circuit first working section with load check valve protection on down-stream of the "P" line and priority flow valve to adjust the flow required(only on the 4 sections monoblock).
- parallel circuit, load check valve protection on down-stream of the pressure "P" line.
- possibility of power beyond.
- spool construction in steel, hardened and nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position.
- available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- possibility of auxiliary valve only on B port, included valve to shift from double acting to single acting spool.
- load check valve mechanical operated on A port available.
- several spool control devices and spool positioning devices.

#### VDM07



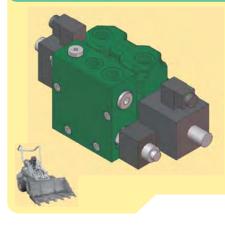
- especially designed for truck crane stabilizers.
- cast-iron monoblock construction.
- parallel circuit, load check valve protection on down-stream of the pressure "P" line.
- possibility of power beyond.
- spool construction in steel, hardened and nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- types of spool: double, single acting, spool motor, float position, regenerative position etc.
- available spool with overcenter valve built-in, available spool with hydraulic kick-out built-in.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- possibility of auxiliary valve on B port or relief valve on neutral line that can unload both the ports.
- several spool control devices and spool positioning devices.

#### VD8A



- especially designed for Diesel engine fork-lift truck
- cast-iron made, inlet module with priority flow valve adjustable by a pressure signal.
- priority flow available to supply a power steering unit.
- two double working modules.
- load check valve protection on down-stream of the pressure "P" line, on every sections.
- overcenter valve built-into the spool to control the tilt function.
- spool construction in steel, hardened and nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- double and single acting spool circuit.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- possibility of auxiliary valve only on B port.
- several spool control devices and spool positioning devices.

### **VD4E100**



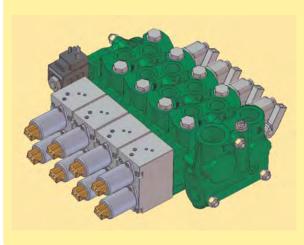
- especially designed for multiutility vehicles.
- 4/3 Directional Control Valve
- 5-chambers model with good spool guidance
- Parallel connection (adding more working sections)
- Cast-iron body (inlet/outlet and working sections)
- Inlet port with Venting Valve
- Main Relief Valve (direct operated or pilot operated)
- Check valve on inlet port (optional)
- Auxiliary inlet port (P2) for second pump with combining flows (optional)
- Direct operation with wet pin solenoid
- Coils can be changed without having to open the pressure-tight chamber
- Manual override, optional
- Open Center and Closed Center spool types



5

# LOAD SENSING VALVES

### VDP08



- load sensing directional control valve.
- made on cast-iron(inlet section, working section, end section).
- available with inlet module for fixed or variable displacement pump.
- inlet module with pressure compensator built-in.
- working modules with pressure compensator built-in.
- possibility of venting valve.
- spool construction in steel, nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- different choices of working flows, choosing the proper spool.
- several types of spool: double, single acting, spool motor, float position etc.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeability of all the spools.
- possibility of auxiliary valve either on port A or B or on both.
- possibility of pressure relief valve on the LS line coming from the ports.
- handle control also with friction to look the spool in every intermediate position.
- pneumatic proportional control available.
- hydraulic proportional control available.
- open loop electro-hydraulic proportional control available 12 or 24 Vdc(picture beside).
- on-off electro-hydraulic control available 12 or 24 Vdc(picture beside).

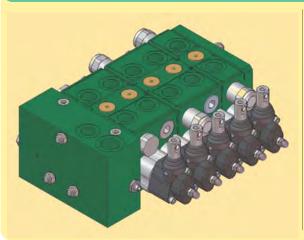
#### Main characteristics

	NOMI FLO		OPERATING PRESSURE	NR. OF SECTION	CIRCUIT*	SECTION DISTANCE		THREADS to ports)
TYPE	on inlet (l/min - <i>US gpm</i> )	on ports (I/min - <i>US gpm</i> )	(bar - <i>psi</i> )			(mm - <i>in</i> )	<b>BSP</b> (ISO 228/1)	UN-UNF (ISO 11926-1)
VDP08	130 - <i>34</i>	95* - <i>25</i> *	315 - <i>4600</i>	1 ÷ 8	FDC / VDC	48 - 1,89	G1/2	SAE 10

### (\*) with compensator

(\*\*) FDC = fixed displacement circuit / VDC = variable displacement circuit

### **VD8ALS**



- load sensing directional control valve.
- made on cast-iron(inlet section, working section, end section).
- available with inlet module for fixed or variable displacement pump.
- inlet module with pressure compensator built-in.
- possibility of venting valve.
- spool construction in steel, nichel-plated to obtain a higher surface hardness and a better corrosion resistance.
- several types of spool: double, single acting, spool motor, float position etc.
- minimum tolerance between the spools and the body to obtain a minimum internal leakage.
- interchangeability of all the spools.
- possibility of auxiliary valve either on port A or B or on both.
- handle control
- pneumatic proportional control available.
- hydraulic proportional control available.
- open loop electro-hydraulic proportional control available 12 or 24Vdc(picture beside).
- on-off electro-hydraulic control available 12 or 24 Vdc(picture beside).

#### Main characteristics

I		NOMINAL FLOW				OPERATING PRESSURE	NR. OF SECTION	CIRCUIT	SECTION DISTANCE	STANDARD (referred	
l	TYPE	on inlet (I/min - <i>US gpm</i> )	on ports (I/min - <i>US gpm</i> )	(bar - <i>psi</i> )			(mm - <i>in</i> )	<b>BSP</b> (ISO 228/1)	UN-UNF (ISO 11926-1)		
	VD8ALS	100 - 26	90 - 24	315 - 4600	1 ÷ 8	FDC / VDC	40 - 1,57	G1/2	SAE 10		

## **GEAR PUMPS**

### 1PE - 1.6PE





- Gear pumps and motors made with alluminium alloy body, flanges and rear covers
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- Nitrile seals as standard and viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Assembling on multiple stage pump available.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

ТҮРЕ		0.9*	1.1*	1.6*	2.1	2.6	3.1	3.6	4.2	4.9	5.8	7.5
Displacement	cm³/rev cu.in./rev	0.91 <i>0.055</i>	1.1 <i>0.067</i>	1.5 0.091	2.1 0.128	2.6 0.158	3.1 <i>0.18</i> 9	3.6 <i>0.21</i> 9	4.2 0.256	4.9 <i>0.</i> 299	5.8 0.354	7.5 0.457
Working pressure p1	bar <i>psi</i>	240 3480	250 3600									220 3190
Intermittent pressure p2	bar <i>psi</i>	560 3770		270 280 3900 4060								240 3480
Peak pressure p3	bar <i>psi</i>	280 4060										260 3770
Max speed								50	00			
Min speed	rpm		700								70	00

<sup>\*</sup> Displacements 0.9 - 1.1 - 1.6 are not available as motors

### 2PE



- Gear pumps and motors made with alluminium alloy body and cast iron flanges and rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Outrigger bearing available.
- Available with several rear covers with valves built-in.
- Assembling on multiple stage pump available on both 2PB and 2PE types.
- Extremely compact design on the multiple assembling pump for the 2PE type.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

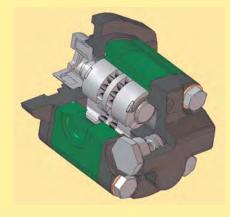
ТҮРЕ	3.2*	4.5	6.2	8.3	11.3	13.8	16	19	22.5	26
Displacement cm³/rev cu.in./rev	3.2 0.19	4.6 0.27	6.5 0.40	8.2 0.50	11.5 <i>0.68</i>	13.8 <i>0.84</i>	16.6 1.01	194 1.15	22.9 1.37	25.8 1.58
Working pressure p1 bar psi				250 3600				220 3140	200 2900	180 2600
Intermittent pressure p2 bar psi				280 <i>4000</i>				240 3450	220 3140	200 2900
Peak pressure p3 bar psi				300 <i>4300</i>				260 3750	240 3450	220 3140
Max speed rpm		4000			3500		30	00	2750	2500
Min speed rpm	600 500					4(	00	400	300	

<sup>\*</sup> Available only as rear pump



### OEMS oriented low noise releases

### 2PZ



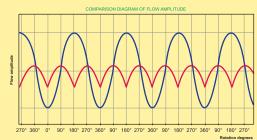
- Gear pumps made with alluminium alloy body and cast iron flanges and rear cov
- 12 teeth double gear staggered assembling construction, to double the flow pulsations in order to reduce the instantaneous flow amplitude, that is the noise level generator.
- Noise level reduction up to 2.5dB(A) at low pressure and up to 3.5dB(A) at high pressure.
- High volumetric efficiency by innovative design and accurate control of machining tolerances
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- Double shaft seals.
- Nitrile seals as standard and viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Outrigger bearing available.
- Available with several rear covers with valves built-in.
- Assembling on multiple stage pump available.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.





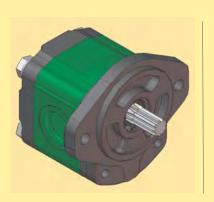






ТҮРЕ		5	8	11	14	16	19	22,5*
Displacement	cm³/rev cu.in./rev	5 0.30	8 0.49	10.9 0.66	13.9 0.85	16 0.98	19 1.16	22.5 1.37
Working pressure p1	bar psi			20 140	210 3000	190 2700	180 2600	
Intermittent pressure p2	bar psi			.50 600		230 3300	210 3000	200 2900
Peak pressure p3	bar psi			.75 950		250 3600	230 3300	220 3140
Max speed	rpm	40	00	35	500	30	000	2750
Min speed	rpm	60	00	5	00			

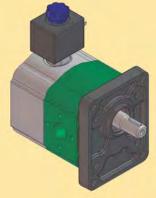
## 2PW - 2MW (displacements, flages and shafts are the same available for 2PE - 2ME)



The geometry of the displacement gearing, matched in form by the rotation of the drive shaft, results in the parabolic flow characteristic shown here on the left. In a standard pump, this characteristic is repeated each time a gear tooth meshes. With their dual-flank system, the flow pulsation of 2PW pumps is reduced by 75 % — with correspondingly lower excitation of downstream system components — at double the fundamental frequency.



### 2ME



- Gear motors made with alluminium alloy body and cast iron flanges and rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Outrigger bearing available.
- Available with several rear covers with valves built-in.
- All motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

ТҮРЕ		4.5	6.2	8.3	10.5	11.3	12.5	13.8	16	19	22.5	26
Displacement	cm³/rev cu.in./rev	4.6 0.27	6.5 0.40	8.2 <i>0.50</i>	10.6 <i>0.65</i>	11.5 <i>0.68</i>	12.7 <i>0.77</i>	13.8 <i>0.84</i>	16.6 1.01	194 1.15	22.9 1.37	25.8 1.58
max. continuous pressure P <sub>1</sub>	bar ( <i>psi</i> )					50 600)				220 (3140)	200 (2900)	180 (2600)
max. starting pressure P <sub>2</sub>										240 (3450)	220 (3140)	200 (2900)
min. rotational speed	rpm	6	00		500					450		
max. rotational speed P <sub>1</sub>	]	4000 3600 3500 3400 3					32	200	3000	2850		
Motor outlet pressure $P_{ ext{out}}$ Leakage-oil line pressure $P_{ ext{drain}}$	bar (psi)	$P_{\text{in}} \longrightarrow P_{\text{drain}} < 5 \text{ bar})$ $P_{\text{out}} \leq 5 \text{ bar})$ $(43 \text{ psi})$ $P_{\text{out}} \leq 120 \text{ bar}$ $(1740 \text{ psi})$										

## 2,5PB - 2,5MB



- Gear pumps and motors made with alluminium alloy body and flanges, cast iron rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Available with several rear covers with valves built-in.
- Extremely compact design on the multiple assembling pump 2.5PB/2.5PB.
- Assembling on multiple stage pump also available in combination with 2PE or 1.5PB types.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

TYPE			5.5*	8.3	11.5	13.8	16	19	22	25	28	32	38	44
Displacement		cm <sup>3</sup> /rev. cu.in./rev.	5.97 <i>0.</i> 36	8.29 <i>0.50</i>	11,76 <i>0.72</i>	14.07 <i>0.86</i>	16 <i>0.97</i>	19.3 1.17	22.2 1.35	25.2 1.53	27.6 1.68	32.4 1.97	38.1 2.32	44.2 2.69
Working pressure	p1	bar <i>psi</i>										200 2900	170 2465	
Intermittent pressure	p2	bar <i>psi</i>									220 3140	190 2700		
Peak pressure	рЗ	bar <i>psi</i>		300 260							240 3 <i>450</i>	210 3000		
Max speed												2750	2500	
Min speed		rpm		600 500								40	00	

<sup>\*</sup> Available only as rear pump

### 3PB - 3MB

### **ACTUAL RELEASE**



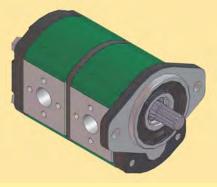
- Gear pumps and motors made with alluminium alloy body, flanges and rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and Viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Outrigger bearing available.
- Available with several rear covers with valves built-in.
- Assembling on multiple stage pump 3PB/3PB available.
- Assembling on multiple stage pump also available in combination with 2PE or 2PB types.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

ТҮРЕ		21*	27	33	38	46	55	65	75*	
Displacement	cm³/rev cu.in./rev	20.6 1.26	27 1.65	33.5 2.04	38.7 2.36	46.9 2.86	54.1 3.30	63.1 3.85	73.4 <i>4.4</i> 8	
Working pressure p1	bar <i>psi</i>			50 :00		245 3500	220 3190	200 2900	180 2600	
Intermittent pressure p2	bar <i>psi</i>			30 1 <i>00</i>		265 3840	240 3480	220 3140	200 2900	
Peak pressure p3	bar <i>psi</i>			00 100		275 3950	250 3600	220 3190		
Max speed	rpm		30	00		2750	2500			
Min speed	rpm	60	400							

<sup>\*</sup>Available for quantity, please contact our sales department.

### **3PE - 3ME**

### **UNDER DEVELOPMENT RELEASE**



- Gear pumps and motors made with alluminium alloy body and flanges, cast iron rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and viton seals in high temperature range.
- Available just with European and SAE flanges, shafts and ports.
- Extremely compact design on the multiple assembling pump 3PE/3PE.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

ТҮРЕ		21*	27	33	38	46	55	65	75*
Displacement	cm³/rev cu.in./rev	20.6 1.26	27 1.65	33.5 2.04	38.7 2.36	46.9 2.86	54.1 3.30	63.1 <i>3.85</i>	73.4 <i>4.4</i> 8
Working pressure p1	bar <i>psi</i>		25 36			245 3500	220 3190	200 2900	180 2600
Intermittent pressure p2	bar <i>psi</i>		28 40		265 3840	240 3480	220 3140	200 2900	
Peak pressure p3	bar <i>psi</i>		30 43			275 3950	250 240 220 3600 3450 3190		
Max speed	rpm		30		2750	2500			
Min speed	rpm	60	00		500	400			

\*Available for quantity, please contact our sales department.

### 3,5PB



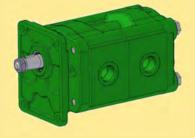
- Gear pumps and motors made with alluminium alloy body, flanges and rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating thrust plates that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and Viton seals in high temperature range.
- Available with flanges, shafts and ports for the main European, German and SAE standards.
- Outrigger bearing available.
- Assembling on multiple stage pump 3,5PB/3,5PB available.
- Assembling on multiple stage pump also available in combination with 2PE, 2PB or 3PB types.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

ТҮРЕ		55	64	75	87	98*			
Displacement	cm³/rev cu.in./rev	54.8 3.34	63.2 3.85	74.7 4.55	88 5.36	99 6.03			
Working pressure p1	bar <i>psi</i>	25 36	50 00	230 3300					
Intermittent pressure p2	bar <i>psi</i>		30 900	250 3600	220 3140				
Peak pressure p3	bar <i>psi</i>	30 43		280 4000	250 3600				
Max speed	rpm	27	50	2500 2250 2000					
Min speed	rpm	400	350	300					

<sup>\*</sup>Available for quantity, please contact our sales dept.

### PG330 - MG330

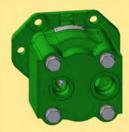




- Gear pumps and motors made in cast iron.
- Construction in 2 pieces: front flange, body and rear cover made in the same piece.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating thrust plates that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Double shaft seals.
- Nitrile seals as standard and Viton seals in high temperature range.
- Available with flanges and shafts for the European and SAE standards.
- Available PTO designs, according to ZF and SAE C standards
- Displacements from 23 cm3/rev (1.43 cu.in./rev) to 40 cm3 /rev (2.46 cu.in./rev).
- Assembling on double stage pump available.
- All pumps and motors are tested after assembly and run-in to ensure the high standard required by Salami engineers.

TYPE		23	28	34	40	47	55	64	72	80	
Displacement	cm³/rev	23.4	28.6	34.4	40.3	47.4	55.2	64.3	73.4	80.6	
	cu.in./rev	1.43	1.74	2.1	2.46	2.89	3.37	3.92	<i>4.4</i> 8	<i>4.91</i>	
Working pressure p1	bar	260	280	280	260	280	260	240	220	200	
	<i>psi</i>	3800	<i>4000</i>	<i>4000</i>	3800	<i>4000</i>	3800	3500	3200	2900	
Intermittent pressure p2	bar	280	300	300	280	300	280	260	240	220	
	<i>psi</i>	<i>4000</i>	<i>4350</i>	<i>4350</i>	<i>4000</i>	<i>4350</i>	<i>4000</i>	3800	3500	32 <i>00</i>	
Peak pressure p3	bar	300	340	320	300	320	300	280	260	240	
	<i>psi</i>	<i>4350</i>	<i>5000</i>	<i>4650</i>	<i>4350</i>	<i>4650</i>	<i>4350</i>	<i>4000</i>	3800	3500	
Max speed	rpm		3000			2700		2500			
Min speed	rpm			40	00			350			

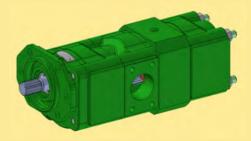
<sup>\*</sup>Available for quantity, please contact our sales department.



Pump or motor with rear ports



Single pump with 2PE in the back (available also in common suction)



**Triple pump construction** 

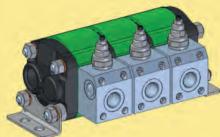


Double pump with 2PE in the back

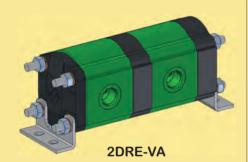
# **GEAR FLOW DIVIDERS**

### 2DRE - 2DRE-AR - 2DRE-VA

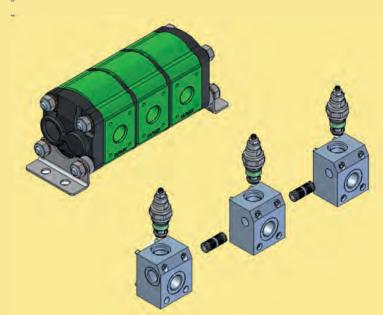




2DRE-AR



- Gear flow dividers made with alluminium alloy body and cast iron flanges and rear covers.
- High volumetric efficiency by innovative design and accurate control of machining tolerances.
- Axial compensation is achieved by using floating bushes that allow high volumetric efficiency througout the pressure range.
- DU bearings ensure high pressure capability.
- 12 teeth integral one-piece gear and shaft.
- Nitrile seals as standard and viton seals in high temperature range.
- Available with ports for the main European, German and SAE standards.
- The bodies are always pre-arranged in order to assemble the cylinder realignement valves.
- Available with common inlet port on the side or on the cast iron covers.
- Assembling on multiple stage up to max. 6 stages.
- 2DRE-AR, release with download of the valve to tank
- 2DRE-VA, release with internal download of the valve
- All flow dividers are tested after assembly and run-in to ensure the high standard required by Salami engineers.



They were tought, from the beginning, in order to be easily managed by dealers. The bodies are always pre arranged in order to be assembled with the valve manifold which realizes the realignement of cylinders. In this way dealers can do stock orders of the complete stages, covers, tie rod kits, valve manifolds. Doing so they can optimize their sales, depending on their customers needs. This can be translated also in an optimization of the warehouse investment.

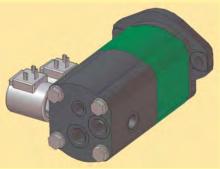
	Displacement		Max. outlet pressure				Max. outlet Δp		Speed		Flow per section		Flow per section	
Туре	Displa	Displacement		p <sub>2</sub>	P <sub>1</sub>	p <sub>2</sub>	between	between sections		max.	min.	max.	min.	max.
	cm³/rev cu.in./rev		bar	bar	psi	psi	bar psi		min <sup>-1</sup>		l/min		gpm	
2DRE - 4,5	4,60	0,27	250	280	3600	4000	50	725	1250	3900	6,05	18,88	1,59	4,97
2DRE - 6,2	6,50	0,40	250	280	3600	4000	50	725	1250	3750	8,55	25,66	2,25	6,75
2DRE - 8,3	8,20	0,50	250	280	3600	4000	50	725	1200	3600	10,36	31,07	2,73	8,18
2DRE - 10,5	10,60	0,65	250	280	3600	4000	50	725	1200	3500	13,39	39,05	3,52	10,28
2DRE - 11,3	11,50	0,68	250	280	3600	4000	50	725	1200	3500	14,53	42,37	3,82	11,15
2DRE - 12,5	12,70	0,77	250	280	3600	4000	50	725	1200	3400	16,04	45,45	4,22	11,96
2DRE - 13,8	13,80	0,84	250	280	3600	4000	50	725	1200	3400	17,43	49,39	4,59	13,00
2DRE - 16	16,60	1,01	250	280	3600	4000	50	725	1100	3200	19,22	55,92	5,06	14,71
2DRE - 19	19,40	1,15	220	240	3150	3450	50	725	1100	3200	22,46	65,35	5,91	17,20
2DRE - 22,5	22,90	1,37	220	240	3150	3450	50	725	1100	3000	26,52	72,32	6,98	19,03
2DRE - 26	25,80	1,58	200	220	2900	3150	50	725	1100	2850	29,87	77,40	7,86	20,37
2DRE - 30	30,10	1,84	200	220	2900	3150	50	725	1100	2700	34,85	85,55	9,17	22,51

### **CUSTOMIZED GEAR MOTORS AND PUMPS**



MOTOR CUSTOMIZED TO RUN AIR COMPRESSOR

FAN DRIVE MOTOR
ELECTRIC PRIORITY FLOW TO ADJUST
THE SPEED AND ELECTRICAL
INVERSION OF THE ROTATION SENSE





HI-LOW PUMP GROUP 2

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